

times associated with Christian saints instead of ghosts—in spite of a general overt adherence to Christianity.

The Caduveo were for long more isolated than the Terena and have in consequence preserved more of their traditional culture. They cling to their hunting and fishing activities though these are an obvious cause of their poverty. It is curious that homosexual habits are admitted to be common among them and shamanistic beliefs flourish. And in spite of declining numbers and a low scale of living they have maintained their traditional skill in the manufacture of pottery of a high artistic quality.

Dr. Oberg's observations are in line with studies of similar conditions that have been made elsewhere. Thus the covert practice of magic and witchcraft side by side with public adherence to European ways and Christian beliefs is widespread in societies of this type in contact with Western civilization. It is to be hoped that Dr. Oberg will follow up this reconnaissance with a more intensive study of these communities.

M. F.

PERSONNEL SELECTION

Vernon, Philip E., and Parry, John B.
Personnel Selection in the British Forces. London, 1949. University of London Press. Pp. 324. Price 20s.

UNTIL the publication of the book by Vernon and Parry, we have had only a few reports on specialized aspects of the work of British psychologists in the Services during the war. This volume provides the first comprehensive account of the substantial contribution which they made to the man-power problems of the fighting Services.

The authors state that their object in writing this book was not only to give an account of the procedures used and the results obtained, but also to relate these methods to the wider panorama of peacetime problems of selection in industry and education. They are particularly well qualified for this task, since both are distinguished psychologists who have been

intimately connected with the psychological work in the three Services.

The book opens with a very compressed historical introduction, summarizing the knowledge which was available to psychologists in this field at the outbreak of war. The remainder of the book is divided into two main parts, of which the first describes the organization of selection and the methods used.

By 1941 the three Services showed alarmingly high failure rates in training courses. To overcome this wastage of manpower, the Senior Psychologist's Department of the Admiralty and the Directorate for Selection of Personnel in the Army were established in 1941. In the R.A.F. the activities of a number of psychologists dealing with ground and air-crews were co-ordinated in the Training Research Branch in 1943.

The authors consider that the greater autonomy of psychologists in the Navy was preferable to the arrangement in the Army, where psychologists acted only as advisers to soldiers who were responsible for the administration of personnel selection.

The size of the problem which faced the psychologists can be gauged from the fortnightly intakes of the Navy and Army which were 2,400 and 12,000 respectively. Since only very few psychologists were available, it was necessary to devise methods of selection which could be administered and interpreted by non-technical staff. Each Service used a battery of tests, consisting usually of tests of general intelligence, verbal ability, educational attainments and special aptitudes. Results were expressed in standard scores, so that each individual could be compared with his Service as a whole. Extensive biographical questionnaires and interviews were used to ascertain the recruit's hobbies, interests, educational and work history, and job preferences. On the basis of this information and the test results, job recommendations were made. The task, as Vernon and Parry point out, was rendered more difficult because of the rapidly shifting demands of the Services depending on their operational needs. It was the duty of the Personnel Selection Officer to fit the

candidate into the most appropriate employment within the requirements of the Services. Psychiatrists were available to give specialist advice to those who were thought to be emotionally unstable or intellectually backward.

Selection of officers was carried out in all the three Services by more intensive programmes of testing and interviewing. The most fully developed scheme, which has received much publicity, was that of the War Office Selection Boards (W.O.S.B.), where candidates were seen by military officers, psychologists and psychiatrists for a period of three days, during which time appraisal of their personality was carried out by means of interviews, projective tests, and observation of group activities. These last included leaderless group situations, a method of observation introduced by Bion and based on Lewin's field theory.

Considerable follow-up data is available on the value of other-rank selection in the three Services. The figures indicate clearly the superiority of more scientific methods of selection over the old methods of selecting on the basis of past trade experience and a rough assessment of educational attainments. The superiority of the officer selection technique is much less firmly established. Vernon and Parry state: "It should not be supposed that the introduction of a few situational tests, apparently analogous to situations involved in the job, provides the key to accurate assessment of personality and job suitability, nor that the fallibility of human judgment and the need for scientific validation are lessened thereby." These remarks must be viewed in the light of the sudden popularity that this method of selection has received, and which has been extended to industry, often without sufficient caution. Vernon and Parry, while clearly stating that the validity of the W.O.S.B. methods is not high, show that they served two very important functions: (1) They had a psychotherapeutic effect in stimulating the recruitment of candidates, which had fallen off because of the dislike of the old methods of selection; (2) They were certainly superior to the standard methods which they replaced.

The account which Vernon and Parry give of the organization of selection and the procedures used in the three Services is very vivid, and gives the reader a clear picture of the problems which were encountered. These were reviewed both from the point of view of the scientific psychologist and from that of the practical man of affairs, who sees the need not only to achieve results but to achieve them in a way which seems fair both to the candidates and the selectors.

In the second part of the book, Vernon and Parry take up the principles of selection in more detail and review the merits and defects of different methods. They outline the essential steps in vocational classification and show that these are applicable to both industry and the Services. Among the points of particular interest which they bring out are: (1) The need to guard against the "naming fallacy," i.e. the assumption that a test is relevant if it has the same name as the quality involved in the job; (2) The need to develop some kind of central training organization for the thorough training of non-technical staff; (3) The need for adequate samples for validation and for duplicate studies as confirmation of experimental results; (4) The great difficulties in obtaining reliable criteria for assessing the value of any selection procedure; (5) The necessity for scientific checks and for caution in generalization; (6) The superiority of cognitive tests measuring the "v" and "ed" factors over those measuring the "g" factor in predicting occupational success in a wide variety of occupations.

Many of the findings which the authors report throw light on important psychological problems such as the differential decline of various intellectual abilities with age, the effects of improved physical health upon intelligence test scores, and sex differences in various special abilities.

A separate chapter is devoted to an interesting account of the main findings in the R.A.F.

The final chapter contains fifteen conclusions which the writers have drawn from their survey of peace-time vocational investigations and from the work of the Services.

This summary is outstanding for the manner in which the writers have been able to compress into a few pages an entire philosophy of the aims and methods of the vocational psychologist.

The book is a mine of information and will certainly become one of the major text books and reference books for psychologists and others concerned with the problem of selection. It is very lucidly written, carefully explains whatever technical terms are used, and has a novel way of presenting information in graph form. The Appendices contain a very useful list of abbreviations, and also present in tabular form information on all the tests discussed in the text. This list reflects the thoroughness with which the book has been written; it gives author, name and use of test, the number of items it contains, the time needed to administer it and its reliability coefficient.

It is to be hoped that the authors will publish a series of volumes on this work, dealing with many of the problems in more detail than has been possible in this book.

H. T. HIMMELWEIT.

POPULATION

The Royal Commission on Population.

Papers. Vol. I. *Report on an enquiry into family limitation and its influence on human fertility during the past fifty years.* By E. Lewis-Fanning. London, 1949. H.M.S.O. Pp. xvi + 202. Price 4s.

THIS detailed and carefully planned enquiry was carried out by the Royal College of Obstetricians and Gynaecologists at the request of the Royal Commission on Population in order that authoritative answers might be made available to certain questions relating to reproductive patterns and habits in this country. These questions could not be adequately or reliably answered from vital statistics nor, because of the preponderance of hyperfertile women attending them, from the figures supplied by the records of birth control clinics, nor from various published surveys of such records.

The questions to which the Royal Commission particularly needed answers are perhaps worth enumerating here as they indicate clearly the scope of the enquiry now under review. They are as follows:

1. How extensively is birth control practised?
2. In what proportions are the different methods of birth control practised?
3. Are there important differences between different social groups in the extent of the practice of birth control, or in the choice of method?
4. To what extent is birth control, as practised, effective?
5. What is the extent of involuntary fertility?
6. Does the practice of birth control affect the power to reproduce?
7. How important is abortion as a method of birth prevention?
8. What is the proportion of "unplanned" pregnancies?
9. What is the proportion of "unwanted" children?
10. What are the chief reasons given for using birth control?

A questionnaire based partly on those devised before the war by Professor Raymond Pearl in America and by the Population Investigation Committee in this country was designed and launched with some care by a special subcommittee of the R.C.O.G. so that answers to these questions might be elicited from a suitable cross section of the population. Accordingly, between August 1946 and June 1947 inclusive, some 11,078 married women were questioned by members of the staff of voluntary and municipal hospitals and by a certain number of general practitioners and health visitors in chosen representative areas throughout the country. No small thanks are due both to questioned and to questioners, for it must have needed considerable concentration and patience to get the numerous questions satisfactorily answered. It was impressed on the interviewers that privacy was essential and that the woman must be assured that any information she gave would be treated with the